# JEFFERSON COUNTY WISCONSIN BICYCLE PLAN EMPHASIS SUMMARY



**2010 COUNTYWIDE PLAN UPDATE** 

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# JEFFERSON COUNTY WISCONSIN

## **BICYCLE PLAN EMPHASIS SUMMARY**

#### 1. BACKGROUND

The 2010 Jefferson County Bicycle Plan has been developed to update the highly acclaimed 1996 Jefferson County Bikeway and Pedestrian-way Plan. It assesses the existing bicycle routes within Jefferson County and its communities and addresses route effectiveness, connectivity to key destinations, and safety. In addition, off-road bike trails are identified to link to primary Glacial Heritage Area (GHA) destinations, and estimated costs and funding sources for future implementation of recommended improvements are also identified.

Up-front planning is a critical element of successful projects. Failure to research and plan prior to initiation often results in poor, un-educated and costly decision making. In order to avoid these pitfalls, the 2010 Jefferson County Bicycle Plan aims to:

- a. Provide quantitative and qualitative background data for decision making. This includes:
  - i. Bicycle facility inventory information.
  - ii. Traffic volume.
  - iii. Crash statistics.
  - Public input from community members, bicycle advocates, municipal representatives, recreation groups, private companies and regional or state agencies.
- b. Serve as an implementation guide for community projects.
- c. Provide documentation and integration details of many on-going initiatives (e.g. Glacial Heritage Area, State Highway 26 corridor) .
- d. Serve as a key document when seeking grant, state or federal dollars. Up-to-date bicycle plans are typically required when applying for bicycle infrastructure and education dollars. It displays a commitment on behalf of the communities the plan will serve.

This summary document serves as a short, but concise resource. It combines data from the 2010 Jefferson County Bicycle Plan and other resources to explain why bicycling matters in Jefferson County Wisconsin.

#### IMPACTS OF BICYCLING

#### e. **ECONOMIC**

- i. Bicycling is one of the most popular outdoor recreation activities in the state and contributes significantly to Wisconsin's economy (WI DNR, 2006; Bicycle Federation of Wisconsin and WI DOT, 2006). In addition to purchasing equipment, resident and non-resident recreational bicyclists support economic activity through expenditures on food and beverages, entertainment, transportation, accommodations, government fees, and other retail shopping while bicycling<sup>1</sup>.
- ii. Results from the "Valuing Bicycling's Economic and Health Impacts in Wisconsin" study (The Nelson Institute for Environmental Studies Center for Sustainability and the Global Environment University of Wisconsin-Madison, January 2010) provides the following economic insights:
  - Bicycle recreation currently supports more than \$924 million in economic activity in Wisconsin, of which nearly \$533 million is direct impact occurring annually (sales, tax revenues and jobs).
  - More than \$535 million is attributable to bicyclists from other states, representing an infusion of outside dollars into the state economy.
  - Increasing non-resident bicycling by 20% has the potential to increase economic activity by more than \$107 million dollars and create 1,528 full-time equivalent jobs.
  - Conclusion: In the current economic climate that encourages people to
    forego exotic vacations for trips closer to home, Wisconsin stands ready
    to attract increasing numbers of bicycle recreationists from the Twin
    Cities, Chicago, and other neighboring areas. Bicycle tourism may serve
    as an important economic development strategy for many areas in
    Wisconsin, particularly those endowed with significant natural
    amenities and able to invest in infrastructure and marketing activities.
- iii. An economic benefit study of the North Carolina Northern Outer Banks (<a href="http://atfiles.org/files/pdf/NCbikeinvest.pdf">http://atfiles.org/files/pdf/NCbikeinvest.pdf</a>, 2004) found:
  - 43% of those surveyed reported bicycling as an important factor in selecting the northern Outer Banks area for vacation.

<sup>1 &</sup>quot;Valuing Bicycling's Economic and Health Impacts in Wisconsin", The Nelson Institute for Environmental Studies Center for Sustainability and the Global Environment University of Wisconsin-Madison, January 2010.

- Bicycling activity in the northern Outer Banks provides substantial economic benefits to the area: an estimated \$60 million annually.
- The average bicyclist surveyed on the provided facilities reported riding on 69% of the days of their trip while in the area. This high rate of bicyclist activity— as well as decisions to extend the duration of visits— may have been influenced by safety. Two-thirds of respondents reported that the bicycle facilities made them feel safer while riding. In addition to encouraging more bicycling and extending bicyclists' stays, the study found that the quality of bicycling was important in decisions to return to the area.
- A high percentage of respondents said that bicycling would be more important in deciding to return (53%) than it was in their decision to come to the area (43%). The research suggests, therefore, that once exposed to the quality of bicycling in the region, visitors are more likely to come back.
- Approximately \$6.7 million of municipal, state and federal funds were
  used to construct the special bicycle facilities in the northern Outer
  Banks. The annual economic impact of cyclists (\$60 million) is estimated
  to be almost nine times greater than the one-time expenditure of public
  funds to construct the bicycle facilities.
- iv. Bicycle facilities (trails and bicycle routes) and parks can provide a high quality of life and recreation that can attract new companies to the area (increasing job opportunities, income and spending).

#### f. HEALTH AND WELLNESS

Bicycling is a simple solution for improving physical fitness and overall health.

- i. Almost 60% of people living in Wisconsin do not meet physical activity recommendations). <sup>1</sup>
- ii. 60% of people living in Wisconsin are overweight or obese (CDC 2005).
- iii. In the United States, among pre-school age children 2-5 years of age, obesity increased from 5 to 10.4% between 1976-1980 and 2007-2008 and from 6.5 to 19.6% among 6-11 year olds. Among adolescents aged 12-19, obesity increased from 5 to 18.1% during the same period.<sup>2</sup>
- iv. Obese children and adolescents are at risk for health problems during their youth and as adults. For example, during their youth, obese children and

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<sup>2</sup> http://www.cdc.gov/obesity/childhood/index.html

adolescents are more likely to have risk factors associated with cardiovascular disease (such as high blood pressure, high cholesterol, and Type 2 diabetes) than are other children and adolescents.<sup>2</sup>

- v. More than 9 million young adults 27 percent of all Americans age 17 to 24 are too overweight to join the military, according to a new report released by MISSION: READINESS, a non-profit group of more than 130 retired admirals, generals and other senior military leaders.<sup>3</sup>
- vi. It is projected that if sedentary residents of Madison, WI (those not meeting minimum physical activity recommendation) met minimum requirements for activity, about \$80.5 million dollars could be saved due to reduced morbidity and healthcare costs<sup>1</sup>.
- vii. One solution to the lack of physical activity is taking advantage of more active forms of transportation, such as bicycling and walking. Replacing short car trips to work or to run errands could be replaced by walking or bicycling.

#### g. **RECREATION**

- More than 49% of Wisconsin residents engage in bicycling for recreation, according to the 2005-2010 Wisconsin Statewide Comprehensive Outdoor Recreation Plan (WI DNR, 2006)
- ii. Bicycling is 12th in popularity out of 95 outdoor recreation activities in Wisconsin, and is more popular than swimming, fishing, camping, running or jogging, golfing, hunting, snowmobiling, and skiing (WI DNR, 2006; Bicycle Federation of Wisconsin and WI DOT, 2006).

#### h. **ENVIRONMENT**

- i. 30-60% of pollution from automobile emissions occurs in the first few minutes following "cold starts". <sup>1</sup>
- ii. Short trips cause more pollution per mile than longer trips. 40% of U.S. automobile trips are less than 2 miles (DOT 2001).
- iii. Bicycle and walking trips that replace automobile trips can go a long way in helping reduce air pollution.

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 $<sup>{\</sup>small \begin{array}{l} {\rm 3} \\ {\rm http://www.disinfo.com/2010/04/too-fat-to-fight-childhood-obesity-endangers-national-security/.} \end{array}}$ 

#### 2. VISION

- a. CONNECTIONS AND LINKAGES: We will have a well-connected bicycle transportation system that links a variety of communities and activity generators (e.g. parks, schools, employment centers, restaurants, downtowns, shopping areas) together into a cohesive and safe transportation system.
- b. TRANSPORTATION ALTERNATIVES: We will have a multi-modal transportation system (bicycling, walking and other forms of transportation) as part of a desirable and livable Jefferson County region for our residents and visitors.
- c. **HEALTHY AND ACTIVE LIFESTYLES:** We will have bicycling facilities that support healthy and active lifestyles.
- d. **SMALL TOWN LIVING:** We will have bicycle facilities that support and enrich our small town lifestyle.
- e. **ECONOMIC DEVELOPMENT:** We will have bicycle facilities that will help grow our existing businesses, contribute to our tourism industry and provide a competitive edge for attracting top talent and companies.
- f. **ENVIRONMENT:** We will have well connected and safe bicycle facilities enabling residents to replace automobile trips with bicycle trips while experiencing the natural resources and scenic beauty of Jefferson County.

#### 3. FACILITIES AND RECOMMENDATIONS

#### a. OFF-ROAD FACILITIES

The development of this plan update was borne out of a desire to capitalize on state and regional efforts occurring throughout the Jefferson County region. Jefferson County led efforts for bicycle improvements planned as part of the STH 26 Bypass (DOT) and improving connections to recreational areas planned in the Glacial Heritage Area (DNR). This plan recommends the addition of five local off-road trail corridors. Working in concert with existing Jefferson County Bike Routes and Recreation Loops these connections have the ability to substantially improve the non-motorized transportation network within the region.

# Recommended facilities additions and improvements:

Route	Key County Destination Points	Notes
Lake Mills to Waterloo	Lake Mills, Waterloo, Garman Nature Preserve, Trek Bicycle Corporation, Holzhueter State Park, Korth Park	A trail connecting the Glacial Drumlin Trail to Waterloo along with on- road connections to Holzhueter State Park will provide great recreational opportunities for residents and visitors.
Waterloo to Watertown via high-speed rail corridor	Waterloo, Watertown, Garman Nature Preserve, Trek Bicycle Corporation, Holzhueter State Park	Beautiful landscape connecting counties largest city with key destinations. With Lake Mills to Waterloo trail, Waterloo to Watertown Trail and SH26 on-road and off-road trail work from Watertown to Jefferson (part of by-pass project) the county will have a major recreational loop that is attractive to multiple day bicycle tourists (primarily all off-road)
Watertown to Oconomowoc via old interurban trail	Watertown, Oconomowoc (lake country)	WE Energies is agreeable to leasing the trail to Jefferson County, at no cost, for the purpose of establishing a multi-modal trail. Trail connects to other trails in Waukesha County. Attractive to multiple day bicycle tourists.

Glacial Drumlin Trail –	Korth Park, Zieloski Marsh,	Key tourist trail; east-west
Connect Jefferson Junction	Lake Mills, Jefferson,	backbone for linking to on-
to eastern trail-head	Sullivan, London	road routes and Glacial
		River Trail system
Glacial River Trail – County	Fort Atkinson, Jefferson	With proper on and off-
W to USH18		road signage and
		completion of SH26 by-
		pass project, cyclists will be
		able to ride from Janesville
		to the Glacial Drumlin Trail
		and beyond primarily on
		off-road trails. Very
		attractive to multiple day
		bicycle tourists.

#### b. ON-ROAD FACILITIES

This plan re-establishes a countywide bike route system. The primary purpose of the Jefferson County Bike Routes is to identify direct, safe connections between communities in the County. Implementation of these routes includes a unique Jefferson County Bike Route signage system, and posting these signs in key decision-making locations to provide direction to users.

The county highway and town road system remains an excellent resource for a variety of transportation and recreation trips. In many cases, improvements such as paved shoulders are a priority where these segments of roadway are needed to complete intercommunity travel. Adding width to the existing paved area also provides comfort for road users, both motorized and non-motorized, and increases the pavement life of the roadway by pushing the pavement edge beyond where heavy vehicles generally operate.

Facilities recommendations were based on a variety of data including existing routes, value of the connection to other features, average annual daily traffic (AADT), likelihood for implementation and field evaluation by enthusiasts. In this study the consultant reaffirmed the continuation of the existing route system. However, this section will identify needed improvements to improve safety and facility quality of existing routes. Whenever deemed practicable, the highest functioning facility was recommended – generally a bike lane or paved shoulder. This plan recommends **five foot paved shoulders** on county highways.

Although the existing bicycle route network is reasonably complete, there are gaps in the system that prevent easy access to some wildlife areas, parks and neighboring communities. Many of these gaps can be resolved with improved bicycle facilities (e.g. paved shoulders). This plan re-affirms the existing Jefferson County bicycle route network as the recommended on-road solution based on up to date level of service rating.

The Jefferson County Parks Department and the University of Wisconsin-Extension Jefferson County office provides a guide to 12 recreational bicycle loop rides within the county. Materials for the loop ride guide were developed in 1999 by Bicycles &, Inc., The Jefferson County Land Information Office and The Jefferson County Bicycle Club. The loop rides, which vary in distance from approximately 16 to 37 miles, are routed along a variety of trails, local roads, state and county highways. In March 2009, the Jefferson County Bike Club met to review and discuss route effectiveness, connectivity to centers of activity, desirability, and safety of the loop rides. The Bike Club did not offer any modifications to the loop rides as they are currently mapped. Therefore, this plan reaffirms the recommended recreational loops as outlined in 1999.

Recommended facilities additions and improvements (county) are focused on improving safety on existing Jefferson County bicycle routes that were outlined in the 1996 plan and identifying additional route improvements to better connect recreational areas and towns.

#### Recommended Route Improvements - NEAR TERM

# Bicycle Level Of Service Rating A - Extremely High B - Very High C - Moderately High D - Moderately Low E - Very Low F - Extremely Low Bicyclists Prohibited Data Sources: Wisconsin Department of Transportation Jefferson County Highway Department

Route Route **BLOS Key County** Notes Rating Destination Improvements Points County O - Newville Rd 5 foot shoulders С Waterloo, Lake Highly utilized to Waterloo Mills, Garmin corridor by Trek Nature Preserve, Bicycle Employees. Little to no shoulder Holzhueter Park with high speeds and a decent volume of traffic from 4-5 p.m. during commute time. SH106 from County CI 5 foot shoulders Kettle Moraine Connection into to Palmyra State Park Kettle Moraine from various routes. A portion of this is currently a section of a recommended Jefferson County Bicycle route SH89 from Island Rd to 5 foot shoulders **Holzhueter State** On existing route Waterloo City Limit Park system. Will provides access via Island Rd to **Holzhueter State** Park

Banker Rd from Fort Atkinson High School to Keisling Rd	5 foot shoulders	NA	Fort Atkinson, Dorothy Carnes Park via Keisling Rd. and Jefferson County Recreational Area	Need to make roads safe for families and children to gain access to Dorothy Carnes Park via bicycle (off-road trail preferred, but this is an option)
Keisling Rd at Banker Rd to County J	5 foot shoulders	NA	Fort Atkinson, Dorothy Carnes Park via Keisling Rd. and Jefferson County Recreational Area	Need to make roads safe for families and children to gain access to Dorothy Carnes Park via bicycle (off-road trail preferred, but this is an option)
County G from County J to Dell Rd	5 foot shoulders	С	Key connector on bike route system	Very dangerous hill; shoulders disappeared when road was re-done a few years ago

### **Recommended Route Improvements - FUTURE**

Route	Route	BLOS	Key County	Notes
	Improvements	Rating	Destination	
			Points	
County B – Lake	5 foot shoulders	С	Korth Park,	Great recreational loop if
Mills City Limit to			Glacial Drumlin	County A work is also
County S			Trail, Lake Mills	done (Lake Mills to
				County B to S to A to
				Lake Mills)
County A –	5 foot shoulders	C, F	Korth Park,	Great recreational loop if
County S to Lake			Glacial Drumlin	County B work is also
Mills			Trail, Lake Mills	done (Lake Mills to
				County B to S to A to
				Lake Mills)
County G – SH12	5 foot shoulders	C, D	Fort Atkinson,	No good on-road
to SH89			Lake Mills	connections from Fort
				Atkinson (2 <sup>nd</sup> largest
				county city) to Lake Mills
County C – SH12	5 foot shoulders	C, D	Red Cedar Lake,	Beautiful terrain
to Dane County			Oakland	attractive to recreational
Line			Highlands, Fort	cyclists; key east-west
			Atkinson	route for possible GHA
				parks
County D – Koch	5 foot shoulders	С	Glacial Drumlin	Key north south
Rd to Glacial			Trail, Kettle	connector between
Drumlin Trail			Moraine State	Jefferson and Palmyra
			Park, Prince's Point	
			Polit	
County Y – Glacial	5 foot shoulders	С	Glacial Drumlin	Key east-west route to
Drumlin Trail to			Trail, Jefferson	connect major wildlife
Rome			Marsh Area, Rome Pond	areas
			Wildlife Area,	
			Jefferson, Rome	
County J –	5 foot shoulders	C, D	Jefferson,	Major connection to
Jefferson to	2 1001 3110010013	0, 5	Oakland	Oakland Highlands
SH106			Highlands	<b>3</b>

#### c. SIGNAGE / ROAD MARKINGS

- To attract multiple day bicycling tourist (who typically spend more money at restaurants, hotels, etc.) and to encourage residents to 'go by bicycle', it is critical that bicycle routes and trails are linked together with signage and route markings.
- ii. Routes need to feel as if they are inter-connected and not a number of disconnected routes. Using the United States interstate system as an example is a good model to follow (you can almost drive cross-country without a map).

#### 4. ENCOURAGEMENT / EDUCATION PROGRAMS

- a. Safe Routes to School (SRTS)
  - i. Program encourages children ages K-8 to walk and bike to school by creating safer walking and biking routes. These programs are funded through the revised federal transportation act - SAFETEA-LU - signed into law on August 10, 2005
  - ii. Communities may apply for planning assistance or for infrastructure/non-infrastructure projects.

#### b. Employer Bike to Work Programs

- i. Employer bicycle to work programs encourage and reward employees to ride their bicycles to work.
- ii. Incentives such as lunch vouchers and team based competitions for most mileage during a period can encourage participation.
- iii. Employers must accommodate employees by providing secure bicycle parking facilities and showers.
- iv. Employers can benefit in the following ways<sup>4</sup>:
  - Improved health care costs management
  - Enhanced employee productivity
  - Decreased rates of illness and injuries
  - Reduced employee absenteeism

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<sup>&</sup>lt;sup>4</sup> http://www.physicalfitness.org/nehf.html

#### 5. IMPLEMENTATION

Just creating this bike plan update does not assure that the called for changes will happen. The adopted visions and strategies must be incorporated throughout the various political systems and organizational structures of the many "communities" in Jefferson County (County, local governments, nonprofits, bicycle advocates, civic, businesses, other entities, citizenry, etc.).

#### Typical activities involved in implementation include:

- Responsibilities of implementation bodies, organizational teams and individuals.
- Broad and/or specific action steps for follow-up.
- Schedules and milestones
- Resource requirements and a communication process.

#### The primary implementation activity of Jefferson County's 1996 Bike Plan involved:

- Implementing several miles of the Glacial River Trail
- Providing about 30 miles of new bikeways (paved 4 foot shoulders) along County highways
- Providing extensive bike route signage
- Using the plan to map recommended bike routes thru the County and thru individual communities; use the plan to recommend 12 recreation routes.

#### a. PRIORITY IMPLEMENTATION ACTIVITIES

- i. Engage all implementation partners so that they are positioned to approve the guiding vision and broad strategies in this plan.
- ii. Empower all implementation partners so that they can determine their own roles in implementing appropriate elements of this plan within their capabilities.
  - **Note:** Implementation of this plan is not under the primary jurisdiction of any one entity. Implementation of the vision and strategies will likely involve a broad spectrum of "change agents". Jefferson County, its communities, nonprofit organizations, advocacy organizations, businesses, many other entities and the general citizenry will all play a role in developing and acting on strategies and actions for which any or combinations of these community structures, organizations or individuals may take leadership.
- iii. Prepare a variety of communication pieces on the Bike Plan Update

- iv. Guided by this plan and appropriate implementing partners, focus on these priority initiatives:
  - Implementation of the 5 priority, high impact off-road paths
  - Implement the continuation of the successful bikeway/shoulder paving program for the identified road segments: priority is given to those links on the recommended, mapped route system.
- v. Other implementation activities will include:

#### **b.** IMPLEMENTATION PARTNERS

- i. Jefferson County: lead engineering and construction of new off-road paths, highway shoulders/bikeways, regional connections, advocacy, grants liaison, maintenance, etc. Bicycle provisions should be considered in all new road projects.
- ii. Jefferson County Tourism Council and Economic Development Consortium: develop a marketing campaign to promote the bicycle facilities in key target markets (e.g. Chicago, Milwaukee, Madison) to attract bicycle tourists and to attract prospective companies looking to re-locate.
- iii. **Jefferson County Bicycle Club:** advocacy, funding partner, education, plan monitoring, visible constituent face
- iv. **Towns / Cities:** signage and route maintenance within the community; use consultant's suggestions to guide improvements.
- v. **Private Sector:** consultation, advocacy, possible funding assistance. Sponsorship opportunities are available.
- vi. State: Glacial Heritage Area Implementation (DNR), transportation (DOT)

The Bike Plan Update and especially the "Plan Emphasis Summary" is an agreed-upon roadmap that should be used to guide the vision and provide an outline of important strategies to move toward this vision. While no one entity is independently responsible for implementation of this vision and strategies, the Jefferson County Parks Department will continue its key role of "advancing" the identifiable steps of implementation. The Jefferson County Parks Committee will keep this plan as a continuous focus, and will interpret it as a living document. It is hoped that the Implementation Partners also take on continuing leadership roles in making the vision come alive for biking in Jefferson County.

6. APPENDIX (maps / tables)